

Reviewer's guide to completing a HuGENet™ *e-Journal Club* review

Overview

This guide is designed for reviewers who are submitting an e-Journal Club review for the first time or for those who may have specific questions about how one is completed.

- E-Journal Club contains two parts: a one-page summary and an accompanying abstraction of the study under review. Completion of the abstraction template is optional, unless requested by HuGENet™ staff.
- Although the completion of the abstraction template provides a critical framework for reviewing specific study issues, additional checklists for appraising the gene prevalence and gene-disease associations will be available when the following paper is published: Little J, Bradley L, Bray MS, et al. Reporting, appraising and integrating data on genotype prevalence and gene-disease associations. *Am J Epidemiol.* in press.
- To view completed e-Journal Club reviews or to submit reviews over the Internet, go to the HuGENet™ web site at <http://www.cdc.gov/genomics/hugenet/ejournal.htm>.
- In the last section of this document, brief instructions and templates are provided for each part of the e-Journal Club. MS Word templates, without the instructions, are available online for downloading at <http://www.cdc.gov/genomics/hugenet/ejournal/template.htm>. In addition, the Office of Genomics and Disease Prevention is in the process of developing a more user-friendly application that reviewers can use to edit and complete a review. This application will help place information from the e-Journal Club summary and abstract into a database.

Comment on process: behind the scenes of an e-Journal Club

E-Journal Club strives to be a timely, informal review of current literature that is available through the HuGENet™ web site and the HuGENet™ listserv for members. However, the editorial and clearance processes that are required of all CDC documents, including those posted electronically, may sometimes prolong the time to publication. We ask for your patience as a reviewer and participant in e-Journal Club.

Clearance checklist for e-journal Club reviewers

The following is a checklist for reviewers. Find the clearance category that fits your circumstance.

- ✓ Write up e-Journal Club using the template(s).
- ✓ If applicable, make sure all fields in the abstraction template are complete.
- ✓ Make any necessary edits, changes, or requested revisions.
- ✓ Obtain the appropriate clearance for your e-Journal Club:
 - Category 1, "I don't work at the CDC:" Follow the clearance procedures, if any, at your own institution.
 - Category 2, "I work at CDC but not at NCEH:" Submit your draft for clearance through your CIO, marking the document is for "electronic distribution" and that "NCEH cross-clearance is needed."
 - Category 3, "I work in NCEH, CDC:" Submit your draft for clearance through NCEH, marking the document is for "electronic distribution".

Questions, comments, and who to call

The HuGENet™ Coordinator, Bruce K. Lin, is here to help you throughout the review process. He will be glad to answer any questions you may have. Contact him at 770-488-4062 or BEL9@CDC.GOV.

Part 1: Template with brief instructions for completing e-Journal Club summary.

[Reference for HuGENet™ e-Journal Club Review]

Reviewed by

[List name(s) of individual(s) who reviewed article for e-Journal Club]

Affiliated agency

[For each person listed above, indicate affiliation]

The Health Outcome

[Describe disease or health outcome, including information on public health significance (prevalence, morbidity, mortality). Include information about genes associated with the health outcome.]

The Findings

[Report the findings of the study. Include type of study, study participant information, a description of the genetic component to the study, major results, and the author's conclusion.]

Public Health Implications

[Describe how the information may or may not impact public health, prevention, or treatment of the disease. Identify gaps in knowledge, where additional research is needed.]

References

List references cited in the text in the following format:

[First Author Last Name] [First Name Initial], et al. [Title of Journal Article]. [Journal Title]. [Year] Month;volume(issue):pages.

Abstraction template with instructions for e-Journal Club.

[Title of HuGENet™e-Journal Club Review]

Abstraction Template

Key variables and description	Article
Reference Complete the bibliographic reference for the article according to AJE format.	[First Author Last Name] [First Name Initial], et al. [Title of Journal Article]. [Journal Title]. [Year] Month;volume(issue):pages.
Category of HuGE information Specify the types of information (from the list below) available in the article: 1. Prevalence of gene variant 2. Gene-disease association 3. Gene-environment interaction 4. Gene-gene interaction 5. Genetic test evaluation/monitoring	
Study hypotheses or purpose State the authors study hypotheses or main purpose for conducting the study.	

<p>Gene(s)</p> <p>Identify the following:</p> <ul style="list-style-type: none"> • Gene name • Chromosome location • Gene product/function • Alleles • OMIM # 	<p>Gene name: Chromosome location Gene product/function Alleles: OMIM #:</p> <p>Gene name: [Repeat for second gene, if applicable] ... </p>
<p>Environmental factor(s)</p> <p>Identify the major environmental factors studied (infectious, chemical, physical, nutritional, and behavioral).</p>	<p>[List numerically]</p>
<p>Health outcome(s)</p> <p>Identify the major health outcome(s) studied.</p>	<p>[List numerically]</p>
<p>Study design</p> <p>Specify the types of study designs (from the list below) in the article:</p> <ol style="list-style-type: none"> 1. Case-control 2. Cohort 3. Cross-sectional 4. Descriptive or case-series 5. Clinical trial 6. Population screening 	<p>[Insert all that apply]</p>

<p>Case definition</p> <p>For study designs 1, 4, and 5, define the following if available:</p> <ul style="list-style-type: none"> • Disease case definition • Exclusion criteria • Gender • Race/ethnicity • Age • Time period • Geographic location • Number of participants (% of total eligible) 	<p>[Note: Depending on the study design being discussed, this cell may not apply]</p> <p>Disease case definition:</p> <p>Exclusion criteria:</p> <p>Gender:</p> <p>Race/ethnicity: [if not specified, insert 'not specified']</p> <p>Age:</p> <p>Time period:</p> <p>Geographic location: [if not specified, insert 'not specified']</p> <p>Number of participants: N (% of total eligible)</p>
<p>Control definition</p> <p>For study design 1, define the following if available:</p> <ul style="list-style-type: none"> • Control selection criteria • Matching variables • Exclusion criteria • Gender • Race/ethnicity • Age • Time period • Geographic location • Number of participants (% of total eligible) 	<p>[Note: Depending on the study design being discussed, this cell may not apply]</p> <p>Control selection criteria:</p> <p>Matching variables:</p> <p>Exclusion criteria:</p> <p>Gender:</p> <p>Race/ethnicity: [if not specified, insert 'not specified']</p> <p>Age:</p> <p>Time period:</p> <p>Geographic location: [if not specified, insert 'not specified']</p> <p>Number of participants: N (% of total eligible)</p>

<p>Cohort definition</p> <p>For study designs 2, 3, and 6, define the following if available:</p> <ul style="list-style-type: none"> • Cohort selection criteria • Exclusion criteria • Gender • Race/ethnicity • Age • Time period • Geographic location • Number of participants (% of total eligible) 	<p>[Note: Depending on the study design being discussed (i.e. case control), this cell may not apply]</p> <p>Cohort selection criteria:</p> <p>Exclusion criteria:</p> <p>Gender:</p> <p>Race/ethnicity: [if not specified, insert 'not specified']</p> <p>Age:</p> <p>Time period:</p> <p>Geographic location: [if not specified, insert 'not specified']</p> <p>Number of participants: N (% of total eligible)</p>
<p>Assessment of environment factors</p> <p>For studies that include gene-environment interactions, define the following if available:</p> <ul style="list-style-type: none"> • Environmental factor • Exposure assessment • Exposure definition • Number of participants with exposure data (% of total eligible) 	<p>Environmental factor:</p> <p>Exposure assessment:</p> <p>Exposure definition:</p> <p>Number of participants with exposure data: N (% of total eligible)</p> <p>Environmental factor: [Repeat for additional environmental factor, if applicable]</p> <p>...</p>
<p>Genotyping</p> <p>Specify the following:</p> <ul style="list-style-type: none"> • Gene • DNA source • Methodology • Number of participants genotyped (% of total eligible) 	<p>Gene:</p> <p>DNA source:</p> <p>Methodology:</p> <p>Number of participants genotyped: N (% of total eligible)</p> <p>Gene: [Repeat for each additional gene, if applicable]</p> <p>...</p>

<p>Analysis</p> <p>Comment on the analysis carried out by the author(s). E.g. matching, modeling or statistical test used. Were the analyses appropriate?</p>	
<p>Results</p> <p>Describe the major results under each of the following HuGE categories. Include tables when data are provided:</p> <ol style="list-style-type: none"> 1. Prevalence of gene variant 2. Gene-disease association 3. Gene-environment interaction 4. Gene-gene interaction 5. Genetic test evaluation/monitoring 	
<p>Conclusion</p> <p>State the author's overall conclusions from the study.</p>	
<p>Comments</p> <p>Provide additional insight, including methodologic issues and/or concerns, about the study.</p>	